

This listing of claims will replace all prior versions and listings of claims in the application.

Listing of Claims:

1. (original) An isolated nucleic acid molecule that comprises a nucleotide sequence having at least about 80% sequence identity to (a) a nucleotide sequence encoding a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64, or PRO-C-MG.72 polypeptide comprising the sequence of amino acid residues from about 1 to about 577 of SEQ ID NO:2, about 1 to about 474 of SEQ ID NO: 4, about 1 to about 506 of SEQ ID NO: 18, about 1 to about 344 of SEQ ID NO: 16, or about 1 to about 633 of SEQ ID NO: 14, respectively, or (b) the complement of the nucleotide sequence of (a).
2. (original) The isolated nucleic acid molecule of Claim 1, comprising the nucleotide sequence from about 66 to about 1796 of SEQ ID NO:1, about 465 to about 1886 of SEQ ID NO:3, about 271 to about 1788 of SEQ ID NO:17, about 267 to about 1298 of SEQ ID NO:15, or about 71 to about 2059 of SEQ ID NO:13, respectively.
3. (original) The isolated nucleic acid molecule of Claim 1, comprising the nucleotide sequence of SEQ ID NO:1 or SEQ ID NO:3, respectively.
4. (original) The isolated nucleic acid molecule of Claim 1, comprising a nucleotide sequence that encodes the sequence of amino acid residues from about 1 to about 577 of SEQ ID NO:2, about 1 to about 474 of SEQ ID NO: 4, about 1 to about 506 of SEQ ID NO: 18, about 1 to about 344 of SEQ ID NO: 16, or about 1 to about 633 of SEQ ID NO: 14, respectively.
5. (original) An isolated nucleic acid molecule comprising a nucleotide sequence that comprises at least about 80% sequence identity to (a) a nucleotide sequence encoding the polypeptide encoded by the human protein cDNA deposited with the ATCC on September 28, 1999, under ATCC Deposit NO PTA-799, on September 28, 1999, under ATCC Deposit No. PTA-798. (DNA-C-MG.2-177 and DNA-C-MG.12-1776, respectively), or (b) the complement of the DNA molecule of (a).

6. (original) The isolated nucleic acid molecule of Claim 5, comprising a nucleotide sequence encoding the polypeptide encoded by the human protein cDNA deposited with the ATCC on September 28, 1999, under ATCC Deposit No. PTA-799, on September 29, 1999, under ATCC Deposit No. PTA-798, (DNA-C-MG.2-1776 and DNA-C-MG.12-1776, respectively).
7. (original) An isolated nucleic acid molecule comprising a nucleotide sequence that comprises at least about 80% sequence identity to (a) the full-length polypeptide coding sequence of the human protein cDNA deposited with the ATCC on September 28, 1999, under ATCC Deposit No. PTA-799, on September 28, 1999, under ATCC Deposit No. PTA-798, (DNA-C-MG.2-1776 and, DNA-C-MG.12-1776, respectively), or (b) the complement of the coding sequence of (a).
8. (original) The isolated nucleic acid molecule of Claim 7 comprising the full-length polypeptide coding sequence of the human protein cDNA deposited with the ATCC on September 28, 1999, under ATCC Deposit No. PTA-799, on September 28, 1999, under ATCC Deposit No. PTA-798, (DNA-C-MG.2-1776 and DNA-C-MG.12-1776, respectively).
9. (original) An isolated nucleic acid molecule encoding a PRO-C-MG.2, Pro-C-MG.12, Pro-C-MG.45, Pro-C-MG.64 or PRO-C-MG.72 polypeptide comprising nucleic acid that hybridizes to the complement of the nucleic acid sequence that encode amino acids about 1 to about 577 of SEQ ID NO:2, about 1 to about 474 of SEQ ID NO: 4, about 1 to about 506 of SEQ ID NO: 18, about 1 to about 344 of SEQ ID NO: 16, or about 1 to about 633 of SEQ ID NO: 14, respectively.
10. (canceled)
11. (original) The isolated nucleic acid molecule of Claim 9, wherein the hybridization occurs under stringent hybridization or wash conditions.

12-14. (canceled)

15. (original) A vector comprising the nucleic acid molecule of Claim 1.

16. (original) The vector of Claim 15, wherein the nucleic acid molecule is operably linked to control sequences recognized by a host cell transformed with the vector.

17. (canceled)

18. (original) A host cell comprising the vector of Claim 15.

19. (original) The host cell of Claim 18, wherein the cell is a CHO cell.

20. (original) The host cell of Claim 18, wherein the cell is an *E. coli*.

21. (original) The host cell of Claim 18, wherein the cell is a yeast cell.

22. (original) A process for producing a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64, or PRO-C-MG.72 polypeptide comprising culturing the host cell of Claim 18 under conditions suitable for expression of the PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64, or PRO-C-MG.72 polypeptide, wherein the PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64, or PRO-C-MG.72 polypeptide is produced.

23. (original) The process of claim 22, further comprising the step of recovering the PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64, or PRO-C-MG.72 polypeptide from the cell culture.

24. (original) An isolated PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64, or PRO-C-MG.72 polypeptide comprising an amino acid sequence comprising at least about 80% sequence identity to the sequence of amino acid residues from about 1 to about 577 of SEQ

ID NO:2, about 1 to about 474 of SEQ ID NO: 4, about 1 to about 506 of SEQ ID NO: 18, about 1 to about 344 of SEQ ID NO: 16, or about 1 to about 633 of SEQ ID NO: 14, respectively.

25. (original) The isolated PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64, or PRO-C-MG.72 polypeptide of Claim 24 comprising amino acid residues about 1 to about 577 of SEQ ID NO:2, about 1 to about 474 of SEQ ID NO: 4, about 1 to about 506 of SEQ ID NO: 18, about 1 to about 344 of SEQ ID NO: 16, or about 1 to about 633 of SEQ ID NO: 14, respectively.

26. (original) An isolated PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64, or PRO-C-MG.72 polypeptide having at least about 80% sequence identity to the polypeptide encoded by the cDNA insert of the vector deposited with the ATCC on September 28, 1999, under ATCC Deposit No. PTA-799, on September 28, 1999, under ATCC Deposit No. PTA-798, (DNA-C-MG.2-1776 and DNA-C-MG.12.1776, respectively).

27. (currently amended) The isolated PRO-C-MG.2, or PRO-C-MG.12, ~~PRO-C-MG.45, PRO-C-MG.64, or PRO-C-MG.72~~ polypeptide of Claim 26 which is encoded by the cDNA insert of the vector deposited with the ATCC on September 28, 1999, under ATCC Deposit No. PTA-799, on September 28, 1999, under ATCC Deposit No. PTA-798, (DNA-C-MG.2-1776 and DNA-C-MG.12-1776, respectively).

28-31. (canceled)

32. (original) A chimeric molecule comprising a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64, or PRO-C-MG.72 polypeptide fused to a heterologous amino acid sequence.

33. (original) The chimeric molecule of Claim 32, wherein the heterologous amino acid sequence is an epitope tag sequence.

34. (original) The chimeric molecule of claim 32, wherein the heterologous amino acid sequence is a secretion signal peptide.

35. (original) The chimeric molecule of Claim 32, wherein the heterologous amino acid sequence is a Fc region of an immunoglobulin.

36. (original) An antibody which specifically binds to a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64, or PRO-C-MG.72 polypeptide.

37. (original) The antibody of Claim 36, wherein the antibody is a monoclonal antibody.

38. (original) The antibody of Claim 36, wherein the antibody is a humanized antibody.

39. (original) The antibody of Claim 36, wherein the antibody is an antibody fragment.

40-59. (canceled)

60. (original) A composition comprising (a) a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, (b) an agonist to a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, (c) an antagonist to a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, or (d) an anti-PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 antibody in admixture with a pharmaceutically acceptable carrier.

61-64. (canceled)

65. (original) The composition of Claim 60, wherein the antagonist is an PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 antisense molecule or antibody.

66-67. (canceled)

68. (original) An article of manufacture comprising:

- (a) a composition comprising (i) a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, (ii) an agonist of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, or (iii) an antagonist of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, in admixture with a pharmaceutically acceptable carrier;
- (b) a container containing the composition; and
- (c) a label affixed to said container, or a package insert included in said pharmaceutical product referring to the use of (a) the treatment of an angiogenic disorder.

69. (canceled)

70. (original) The article of manufacture of Claim 68, wherein the antagonist is an anti-PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 antibody or antigene compound.

71-73. (canceled)

74. (original) A method for identifying a compound that inhibits an activity of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide comprising contacting a test compound with a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide under conditions and for a time sufficient to allow the test compound and polypeptide to interact and determining whether the activity of said PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide is inhibited.

75. (original) A method for identifying a compound that inhibits the expression of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide or gene in cells that normally expresses the polypeptide, wherein the method comprises contacting the cells with a test compound under conditions suitable for allowing expression of said PRO-C-MG.2,

PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide and determining whether the expression of the PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide or gene is inhibited.

76-78. (canceled)

79. (original) A method of diagnosing a cardiovascular, endothelial or angiogenic disorder in a mammal which comprises analyzing the level of expression of a gene encoding a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide (a) in a test sample of tissue cells obtained from said mammal, and (b) in a control sample of known normal tissue cells of the same cell type, wherein a higher or lower expression level in the test sample as compared to the control sample is indicative of the presence of a cardiovascular, endothelial or angiogenic disorder in said mammal.

80. (original) A method of diagnosing a cardiovascular, endothelial or angiogenic disorder in a mammal which comprises detecting the presence or absence of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide in a test sample of tissue cells obtained from said mammal, wherein the presence or absence of said PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide in test sample is indicative of the presence of a cardiovascular, endothelial or angiogenic disorder in said mammal.

81. (currently amended) A method of diagnosing a cardiovascular, endothelial or angiogenic disorder in a mammal according to claim 80 comprising (a) contacting an anti-PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 antibody with a test sample of tissue cells obtained from the mammal, and (b) detecting the formation of a complex between the anti-PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 antibody and a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide in the test sample, wherein the formation of said complex is indicative of the presence of a cardiovascular, endothelial or angiogenic disorder in the mammal.

82-84. (canceled)

85. (original) A method for treating a cardiovascular, endothelial or angiogenic disorder in a mammal comprising administering to the mammal a therapeutically effective amount of (a) a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, (b) an agonist of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, or (c) an antagonist of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide.

86. (original) The method of Claim 85, wherein the disorder is vascular trauma or cancer.

87-89. (canceled)

90. (original) The method of Claim 85 wherein said antagonist is an anti-PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 antibody or antigen.

91. (original) A method for treating a cardiovascular, endothelial or angiogenic disorder in a mammal comprising administering to the mammal a nucleic acid molecule that encodes (a) a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, (b) an agonist of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, or (c) an antagonist of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide.

92. (canceled)

93. (original) The method of Claim 91 wherein said antagonist is an anti-PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 antibody or antigen.

94. (canceled)

95. (original) The method of Claim 91, wherein the cardiovascular, endothelial or angiogenic disorder is vascular trauma or a cancer.

96-97. (canceled)

98. (currently amended) A method for modulating ~~inhibiting~~ endothelial cell growth in a mammal comprising administering to the mammal an effective amount of (a) PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, (b) an agonist of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, (c) an antagonist of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, or (d) an anti-PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 antibody, wherein endothelial cell growth in said mammal is inhibited.

99. (canceled)

100. (currently amended) A method for modulating ~~inhibiting~~ angiogenesis comprising administering an effective amount of an (a) a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, (b) an agonist of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, or (c) an antagonist of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, to the mammal, wherein said angiogenesis is inhibited.

101-103. (canceled)

104. (original) A method for treating a tumor, reducing the size of a tumor, reducing the vasculature supporting a tumor, or reducing the tumor burden of a mammal, comprising administering to a mammal in need thereof a therapeutically effective amount of (a) a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, (b) an agonist of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, or (c) an antagonist of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide.

105. (original) A method for treating a disease or disorder characterized by undesirable excessive neovascularization, comprising administering to a mammal in need thereof a therapeutically effective amount of (a) a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, (b) an agonist of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide, or (c) an antagonist of a PRO-C-MG.2, PRO-C-MG.12, PRO-C-MG.45, PRO-C-MG.64 or PRO-C-MG.72 polypeptide.

106. (currently amended) The method of claim 105, wherein the disease or disorder is selected from the group consisting of rheumatoid arthritis, psoriasis, atherosclerosis, retinopathy, retrolental fibroplasias, neovascular glaucoma, age-related macular degeneration, thyroid hyperplasias, Grave's disease, tissue transplantation, chronic inflammation, lung inflammation, and obesity.

107-112. (canceled)